MEMORANDUM



Date:

June 26, 2007

To:

Honorable Chairman Bruno A. Barreiro

and Members, Board of County Commissioners

From:

George M. Burgess

County Manage

Agenda Item No.8(R)3(I)

Subject:

Request to Advertise for Design and Construction Management Services for North District

Wastewater Treatment Plant Water Reclamation Facility - Contract No: E07-WASD-04

Recommendation

This Request to Advertise for a consultant selection for Contract No: E07-WASD-04 has been prepared by the Miami-Dade Water and Sewer Department (MDWASD) and is recommended for approval to provide planning, design, permitting and construction management services for the construction of a 6.8 million gallons per day (MGD) Water Reclamation Facility at the MDWASD North District Wastewater Treatment Plant (NDWWTP).

Scope

PROJECT NAME:

Design and Construction Management Services for North District Wastewater

Treatment Plant Water Reclamation Facility

PROJECT NO:

E07-WASD-04

CONTRACT NO:

E07-WASD-04

PROJECT DESCRIPTION:

The consultant is to provide planning, design, permitting and construction management services for the construction of a 6.8 MGD Water Reclamation Facility at the MDWASD NDWWTP. This water reclamation facility will use the treated effluent to irrigate the North Miami Stadium, the Biscayne Landings Development adjacent to the NDWWTP, the North Campus of the Florida International University, various locations within the City of North Miami Beach and possibly North Miami.

PROJECT LOCATION:

2575 N.E. 151st Street North Miami, FL 33160

PRIMARY COMMISSION

DISTRICT:

District 4

Sally A. Heyman

APPROVAL PATH:

Board of County Commissioners

OCI A&E PROJECT

NUMBER:

E07-WASD-04

USING DEPARTMENT:

Miami-Dade Water and Sewer Department

MANAGING DEPARTMENT:

Miami-Dade Water and Sewer Department

Fiscal Impact / Funding Source

FUNDING SOURCE:

SOURCE

WASD Revenue Bonds Sold, Plant Expansion Wastewater Fund and Future

WASD Revenue Bonds

PTP FUNDING:

No

GOB FUNDING:

No

CAPITAL BUDGET

BUDGET PROJECT / DESCRIPTION

PROJECT:

965630-WASTEWATER TREATMENT PLANTS EFFLUENT

\$3,740,000.00

REUSE

Book Page: 314 Funding Year: 2007-2008

PROJECT TECHNICAL CERTIFICATION **REQUIREMENTS:**

TYPE CODE DESCRIPTION

Prime 6.03 WATER AND SANITARY SEWER SYSTEMS -

WATER AND SANITARY SEWAGE TREATMENT

PLANTS

Prime 11.00 GENERAL STRUCTURAL ENGINEERING

Prime 17.00 ENGINEERING CONSTRUCTION MANAGEMENT

Other 9.02 SOILS, FOUNDATIONS AND MATERIALS

TESTING - GEOTECHNICAL AND MATERIALS

ENGINEERING SERVICES

Other 12.00 GENERAL MECHANICAL ENGINEERING

Other 13.00 GENERAL ELECTRICAL ENGINEERING

Other 15.01 SURVEYING AND MAPPING - LAND SURVEYING

Other 16.00 GENERAL CIVIL ENGINEERING

ESTIMATED CONTRACT

PERIOD:

Calendar Days

1460 Consecutive Calendar Days = 4 years: Planning - Design = 1 year;

Permitting - Procurement = 1 year; Construction - Startup = 2

vears.

ESTIMATED CONTINGENCY 146 Consecutive

PERIOD:

Calendar Days

IG FEE INCLUDED IN BASE Yes

CONTRACT:

ART IN PUBLIC PLACES:

No

BASE ESTIMATE:

\$3,400,000.00

TYPE PERCENT AMOUNT CONTINGENCY COMMENT

ALLOWANCE (SECTION 2-8.1 MIAMI DADE COUNTY

CODE):

\$340,000.00 PSA 10%

TOTAL DEDICATED ALLOWANCE:

\$0.00

COST ESTIMATE:

\$3,740,000.00

Track Record / Monitor

EXPLANATION:

MINIMUM QUALIFICATIONS No

EXCEED LEGAL REQUIREMENTS:

REVIEW COMMITTEE:

MEETING DATE: 4/11/2007 SIGNOFF DATE: 4/11/2007

RESPONSIBLE WAGES:

No

REVIEW COMMITTEE

ASSIGNED CONTRACT

MEASURE GOAL

COMMENT

MEASURES:

CBE

20.00% CBE

CWF

0.00% Not Applicable

MANDATORY CLEARING

HOUSE:

No

CONTRACT MANAGER

NAME/PHONE/EMAIL:

Howard J Fallon Jr

786-552-8225

HJFAL01@miamidade.gov

PROJECT MANAGER NAME/PHONE/EMAIL: Patty David

786-552-8040

pattyd@miamidade.gov

Background

BACKGROUND: This water reclamation facility is a requirement of Miami-Dade County's

Interim Consumptive Use Authorization and Agreement with the South Florida Water Management District executed in May 2006, under which the County has committed to developing alternative water supplies to meet its increased demands from sources other than the Biscayne Aquifer. Flows from the proposed 6.8 MGD Water Reclamation Facility at MDWASD's NDWWTP have been submitted to the South Florida Water Management District as part of the Alternative Water Supply requirement with a

completion schedule in December 2010.

This water reclamation facility will use the treated effluent to irrigate the North Miami Stadium, the Biscayne Landings Development adjacent to the NDWWTP, the North Campus of the Florida International University, various locations within the City of North Miami Beach and possibly North Miami.

BUDGET APPROVAL FUNDS AVAILABLE:	OSBM DIRECTOR	5-30-07 DATE
APPROVED AS TO LEGAL SUFFICIENCY:	COUNTY ATTORNEY	5-30 -07 DATE
	ASSISTANT COUNTY MANAGER	5/31/07 DATE
CLERK DATE		

DATE

Request to Advertise Design and Construction Management Services for the North District Wastewater Treatment Plant Water Reclamation Reuse Facility Project No. E07-WASD-04

BUDGET PROJECT AND

DESCRIPTION:

965630 - Wastewater Treatment Plants Effluent Reuse

FUNDING SOURCE:

Future WASD Revenue Bonds 2009S

Future Bond Issue

INDEX CODES:

EW623 Plant Expansion Wastewater Fund

EW643 WASD Revenue Bonds Sold

ASSISTANT DIRECTOR,

ENGINEERING:

EDUARDO A. VEGA, P.E.

ATE

DEPT. BUDGET OFFICER

PEDRO VELAR

DATE

ASSISTANT DIRECTOR,

FINANCE

DIANE CAMACHO

DATE

DEPUTY DIRECTOR, OPERATIONS

JOSEPH A. RUIZ, JR.

DATE

MIAMI-DADE COUNTY, FLORIDA NOTICE TO PROFESSIONAL CONSULTANTS

MIAMI-DADE WATER AND SEWER DEPARTMENT DESIGN AND CONSTRUCTION MANAGEMENT SERVICES FOR THE NORTH DISTRICT WASTEWATER TREATMENT PLANT WATER RECLAMATION FACILITY PROJECT NO. E07-WASD-04

The County Manager, Miami-Dade County, pursuant to Chapter 287.055, Florida Statutes, and Chapter 2, Sections 2-8.1 (as amended Ordinance 05-105) and 2-10.4 of the County Code and Administrative Order 3-39, announces that the Miami-Dade Water and Sewer Department (MDWASD) will require professional engineering services from a qualified consultant to provide planning, design, permitting and construction management services for the implementation of a Water Reclamation Facility at the MDWASD North District Wastewater Treatment Plant approximately 6.8 million gallons per day (MGD), pending finalization of water reclamation application points. Uses of water reclamation facility effluent will include irrigation at North Miami stadium and the Biscayne Landings development adjacent to the plant, the North Campus of Florida International University, various locations within the City of North Miami Beach and possibly North Miami and for a vehicle wash station in the City of North Miami Beach. Treatment facilities are included in the MDWASD Reuse Feasibility Study and the flows have been submitted to the South Florida Water Management District as part of the Alternative Water Supply requirement with a completion schedule in December, 2010. This requirement is included in the Interim Consumptive Use Authorization and Agreement with the South Florida Water Management District executed in May 2006, under which Miami-Dade County has committed to developing alternative water supplies to meet its increased demands from sources other than the Biscayne Aquifer.

The scope of work shall include process evaluation, including possible inclusion of a part of existing facilities with any recommended upgrades, preparation of complete detailed construction drawings and specifications; conceptual design of the delivery systems including pipeline sizing, routing and storage; design of water reclamation pumping station and on-site storage, detailed cost estimates; attendance at meetings, contract interpretations and clarifications, review of claims and potential change order requests; review and processing of shop drawings, review of schedule of values and as-built drawings, assist in property acquisition; provide permitting services and bidding and construction management services, answering requests for information, start-up assistance and final inspection; utility coordination, surveying, and geotechnical work; prepare operations and maintenance manuals and provide training for operations and maintenance; provide record drawings documentation; provide transactional system integration and database development through design and construction. Design of water reclamation facility transmission lines will be by others. Project coordination services are anticipated to include, establishing a plan to implement the project, establish and track project schedule, budget and deadlines, prepare status reports and attend meetings as requested. Included also shall be public information services for coordination with residents regarding the water reclamation systems. The total estimated construction cost of the project is \$14 million.

The prime and/or subconsultants are required to have experience with the design and construction management services of least one (1) similar sized facility with the advanced treatment required for this project within the past five (5) years. The MDWASD intends to retain one qualified firm under a non-exclusive Professional Services Agreement. The term of the contract is for a four (4) year period. Maximum compensation is \$3,400,000 plus



contingency in accordance with Ordinance 00-65. No minimum amount of work or					
compensation will be assured to the retained consultant. The County reserves the right to re-use					
the work products of the retained consultant and to retain other consultants to provide the same					
or similar services at its sole discretion. The consultant coordinator for this project is					
who may be contacted via e-mail at or fax at					
with copy to the Clerk of the Board.					

TECHNICAL CERTIFICATION REQUIREMENTS

Prime

6.03 Water and Sanitary Sewage Treatment Plants

11.00 General Structural Engineering

17.00 Engineering Construction Management

Prime and/or Subconsultants

9.02 Geotechnical and Materials Engineering Services

12.00 General Mechanical Engineering

13.00 General Electrical Engineering

15.01 Land Surveying

16.00 General Civil Engineering

CBE Goal 20%

BREAKDOWN LIST

		<u>%</u>	CBE%
06.03	Water and Sanitary Sewage Treatment Plants	$\overline{20}\%$	
12.00	General Mechanical Engineering	15%	15%
13.00	General Electrical Engineering	15%	
17.00	Engineering Construction Management	15%	
11.00	General Structural Engineering	15%	
16.00	General Civil Engineering	10%	5%
09.02	Geotechnical and Materials Engineering Service	es 5%	
15.01	Land Surveying	5%	
	TOTAL	100%	20%

STRATEGIC AREA: Neighborhood and Unincorporated Area Municipal Services ******* FUNDED PROJECTS ******* (dollars in thousands) DEPARTMENT: Water and Sewer WASTEWATER TREATMENT PLANTS EFFLUENT REUSE PROJECT # 965630 DESCRIPTION: Begin planning and construction of facilities for an effluent reuse system at wastewater treatment plants LOCATION: Systemwide Systemwide DISTRICT LOCATED: Systemwide ESTIMATED ANNUAL OPERATING IMPACT: Minimal DISTRICT(s) SERVED: Systemwide REVENUE SCHEDULE: **PRIOR** 2006-07 2007-08 2008-09 2009-10 2010-11 **FUTURE** TOTAL 2011-12 Wastewater Connection Charges 80 0 0 0 0 0 0 0 80 WASD Revenue Bonds Sold 22,934 0 0 0 0 0 0 0 22,934 **TOTAL REVENUE:** 23,014 0 0 0 0 0 0 0 23,014 **EXPENDITURE SCHEDULE: PRIOR** 2006-07 2007-08 2008-09 **FUTURE** TOTAL 2009-10 2010-11 2011-12 Planning and Design 26 572 1,496 0 0 0 2,094 0 Construction 5,716 265 14,939 0 0 0 0 20,920 **TOTAL EXPENDITURES:** 291 6,288 16,435 0 0 0 0 23,014 WASTEWATER TREATMENT PLANTS MISCELLANEOUS UPGRADES PROJECT # 9652061

TOTAL EXPENDITURES:	165	150	1,500	0	0	0	2,664	11,047	15,526
Construction	150	136	1,364	0	0	0	2,422	10,042	14,114
Planning and Design	15	14	136	0	0	0	242	1,005	1,412
EXPENDITURE SCHEDULE:	PRIOR	2006-07	2007-08	2008-09	2009-10	2010-11	2011-12	FUTURE	TOTAL
TOTAL REVENUE:	1,815	0	0	0	0	0	13,074	637	15,526
Future WASD Revenue Bonds	0	0	0	0	0	0	13,074	0	13,074
WASD Revenue Bonds Sold	1,353	0	0	0	0	0	0	0	1,353
Wastewater Connection Charges	462	0	0	0	0	0	0	637	1,099
REVENUE SCHEDULE:	PRIOR	2006-07	2007-08	2008-09	2009-10	2010-11	2011-12	FUTURE	TOTAL
Systemwide ESTIMATED ANNUAL OPERATING IMPACT:	Minimal			DISTRICT LC DISTRICT(s)		Systemwide Systemwide			
LOCATION: Wastewater Treatment Plani	ts								
DESCRIPTION: Upgrade wastewater treatment pla	nts to meet	regulatory re	quirements						

BUDGET PROJECT 965630

Project Title: 965630-WASTEWATER TREATMENT PLANTS EFFLUENT REUSE								
Project Desc: Begin planning and construction of facilities for an effluent reuse system at wastewater treatment plants								
Project \$\$	Start:	End:	Prior:	<u>06-07:</u>	07-08:	<u>08-09:</u>	<u>09-10:</u>	Total:
(\$\$ in 000's)	10/1/2003	9/30/2007	<u>291</u>	6,288	<u>16,435</u>	<u>0</u>	<u>0</u>	23,014
		Project	t Type: Ca _l	pital			•	
CDPWeb Project Milestones (\$ IN 000'S)								
Milestone:	Start:	End:	Prior:	<u>06-07:</u>	<u>07-08:</u>	<u>08-09:</u>	<u>09-10:</u>	<u>Total:</u>
Planning/Design	N/A	N/A	26	572	1,496	0	0	2,094
Construction	N/A	N/A	<u> 265</u>	<u>5,716</u>	<u>14,939</u>	<u>0</u>	<u>0</u>	20,920
CDPWeb Project Revenue (\$ IN 000'S)								
Revenue:	Start:	<u>End:</u>	Prior:	<u>06-07:</u>	<u>07-08:</u>	<u>08-09:</u>	<u>09-10:</u>	<u>Total:</u>
Wastewater Connection	N/A	N/A	80	0	0	0	0	80



Current Contracts for Project 965630

			RIA	Award	
			Budget	Budget	CIIS
<u>Dept</u>	<u>ContractNo</u>	Contract Name	<u>Allocation</u>	<u>Allocation</u>	Award
<u>WS</u>	E07-WASD-04	Design and Construction Manage	\$3,400,000.00	<u>\$0.00</u>	\$0.00

There are no SItes for Project 965630



Dept. of Business Development

Project Worksheet

Project/Contract Title:

DESIGN AND CONSTRUCTION MANAGEMENT SERVICES FOR THE

NORTH DISTRICT WASTEWATER TREATMENT PLANT WASTEWATER

RC Date: 04/11/2007 1-09

REUSE FACILITY (SIC 871)

Project/Contract No:

E07-WASD-04

Funding Source:

Item No:

Department:

WATER & SEWER DEPARTMENT

VARIOUS

Estimated Cost of Project/Bid: \$3,400,000.00

Resubmittal Date(s):

Description of Project/Bid:

TO ESTABLISH A CONTRACT TO EMPLOY AN ENGINEERING FIRM TO PROVIDE DESIGN AND CONSTRUCTION MANAGEMENT SERVICES FOR THE CONSTRUCTION OF THE NORTH DISTRICT WASTEWATER TREATMENT PLANT WASTEWATER RESUSE FACILITY. THE SCOPE OF WORK SHALL ALSO INCLUDE PROCESS EVALUATION, PREPARATION OF COMPLETE DETAILED CONSTRUCTION DRAWINGS AND SPECIFICATIONS, AND CONCEPTUAL

DESIGN OF THE DELIVERY SYSTEMS (AMONGST OTHER FUNCTIONS).

Contra	ct Measures Recomn	endation		
Measure	Program	Goal Percent		ele de la come
Goal	CBE	20.00%		
Rea	sons for Recommend	lation •		
This project meets all the criteria set forth in A.O. 3-32,	Section V.			
Funding sources: Future WASD Revenue Bonds and Plants SIC 871 - Architectural and Engineering Services	ant Expansion Wastew	ater Fund		
SIC 6/1 - Alcintectural and Engineering Services				
Analysis	for Recommendation	rof a Goal	Control of the second	
Subtrade	Cat.	Estimated Value	% of Items to Base Bid	Availability
GENERAL MECHANICAL ENGINEERING	CBE	\$510,000.00	15.00%	24
GENERAL CIVIL ENGINEERING	CBE	\$170,000.00	5.00%	56
	Total	\$680,000.00	20.00%	
ving Wages: YES NO X				
sponsible Wages: YES NO X				

Ordinance 90-143 is applicable to all construction projects over \$100,000 that do not utilize Federal Funds

a Ri	EVIEW COMMITTE RECOMMENDATION	Line states of the state of the
Tier 1 Set Aside		
Set Aside Level 1	Level 2 Level 3	
Trade Set Aside (MCC)	Goal 20 / Bid Preferen	ıce
No Measure	Deferred Selection Fa	ctor
Elward loguing	4.11.07	
Chairperson, Review Committee	Date County Manager	Date